

## Implementation of double-pulse laser control in optical Kerr effect spectroscopy

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### Abstract

Two-pulse control of time-dependent anisotropy in liquid CCl<sub>4</sub> and CHCl<sub>3</sub> at room temperature is implemented using femtosecond polarisation spectroscopy. Non-resonant excitation was enhanced by means of the double-pulse pump-probe technique. It is shown that by varying the delay between the exciting pulses and their relative intensity, selection of contributions of individual intramolecular modes into the recorded signal is achieved. The molecular responses were detected using the time-resolved optically heterodyne-detected optical-Kerr-effect technique. © Published under licence by IOP Publishing Ltd.

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